PATENT
YOR920030284US1

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of	:	Russell A. Budd, et al.
Serial Number	:	10/675,139
Filing Date	:	September 30, 2003
Examiner	:	Wai Sing Louie
Group Art Unit	:	2814
For	:	SILICON BASED OPTICAL LENSES

TO: The Honorable Commissioner of Patents
and Trademarks
Post Office Box 1450
Alexandria, VA 22313-1450

AMENDMENT

In response to the Official Action dated July 17, 2007, please amend the above-identified application as follows:

IN THE CLAIMS:

Cancel Claims 11 - 62 without prejudice subject to be refiled in a divisional application.

Add new Claim 63.

It is noted in the July 17, 2007 Official Action that the Examiner has withdrawn Claims 11 – 49 from the application for examination. Applicants filed this Application with 62 claims as is shown on the filing receipt dated December 20, 2006. It is respectfully requested that Claims 50 to 62 be reinserted into the scope of the withdrawn claims.

The Examiner is respectfully requested to reconsider the rejections of Claims 1 - 4 and 6 - 10 under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,777,715 to Geusic, et al. in view of U.S. Publication 2003/0142896 to Kikuchi, et al.

Geusic, et al. disclose an optical waveguide which has a reflective layer and a hollow core. (Column 4, lines 36 – 37). The reflective layer is aluminum. At Column 5, lines 1 – 5 Geusic, et al. note that the waveguide could be filled with a material having an index of refraction greater than 1, but the aluminum would have to survive the deposition of the material. The Examiner concedes that Geusic et al. does not disclose the sidewalls covered with a layer of low refractive index material, or fully filled with a high refractive index material to form the core layer.

Kikuchi et al. discloses an optical waveguide that is planar as constructed, Note in [00640 Kikuchi et al. states that "...The optical waveguide board 10 is made up of a substrate 2, an optical path changing unit 3 being formed on the substrate 2 used to change a direction of an optical path of incident light from a direction being vertical to a surface of the substrate 2 to a direction being horizontal to the surface of the substrate 2... The optical waveguide 4 is adhered to the substrate 2 using an adhesive 8. (Emphasis added) ... Also, the optical waveguide 4 may be also configured in still another manner that the core layer 6 made of silica glass being wrapped by the clad layer 7 made of silica glass is fixed on the substrate 2 using the adhesive 8 or the core layer 6 made of an optic fiber being wrapped by the clad layer 7 made of an optic fiber is fixed on the substrate 2 using the adhesive 8."

Applicants respectfully point out that optical waveguides can be classified according to their geometry (planar, strip or fiber waveguides), mode structure (single-mode, multi-mode), refractive index distribution (step or gradient index) and material (glass, polymer, semiconductor). Thus although, Geusic and Kikuchi both relate to optical waveguides, they disclose totally different species.

It is not proper to combine the references cited to Geusic, et al. and Kikuchi et al. in view of the disparate systems that are disclosed therein. Geusic, et al. and Kikuchi et al. are directed toward totally different disciplines within the optical waveguide field. Applicants submit that the prior art does not allow or support the conclusion of obviousness that the Examiner seeks to establish.

In order to analyze the propriety of the Examiner's rejections in this case, a review of the pertinent applicable law relating to 35 U.S.C. § 103 is warranted. The Examiner has applied the Geusic, et al. and Kikuchi et al.references discussed above using selective combinations to render obvious the invention.

The Court of Appeals for the Federal Circuit has set guidelines governing such application of references. These guidelines are, as stated are found in Interconnect Planning Corp. v. Feil, 774 F.2d 1132, 1143, 227 USPQ, 543, 551:

> *When prior art references require selective combination by the court to render obvious a subsequent invention, there must be some reason for the combination other than hindsight gleaned from the invention itself.*

A representative case relying upon this rule of law is Uniroyal, Inc. v. Rudkin-Wiley Corp., 837 F.2d 1044, 5 USPQ 2d 1434 (Fed. Cir. 1988). The district court in Uniroyal found that a combination of various features from a plurality of prior art references suggested the claimed invention of the patent in suit. The Federal Circuit in its decision found that the district court did not show, however, that there was any teaching or suggestion in any of the references, or in the prior art as a whole, that would lead one with ordinary skill in the art to make the combination. The Federal Circuit opined:

> *Something in the prior art as a whole must suggest the desirability, and thus the obviousness, of making the combination.* [837 F.2d at 1051, 5 USPQ 2d at 1438, citing Lindemann, 730 F.2d 1452, 221 USPQ 481, 488 (Fed. Cir. 1984).]

Applicants respectfully submit that there is no basis for the combination of the aforementioned references cited by the Examiner. Applicants respectfully point that the Geusic, et al. and Kikuchi et al.references have totally different objectives in mind. The Examiner has selected elements from these disparate references for the sake of showing the individual elements claimed without regard to the total teaching of the references.

The Examiner is improperly picking and choosing. The rejections are piecemeal

constructions of the invention. It is essentially including the elements missing from Geusic, et al. with the elements conveniently found in Kikuchi et al. when Kikuchi et al. s directed to a totally different species in Geusic, et al. Such piecemeal reconstruction of the prior art patents in light of the instant disclosure is contrary to the requirements of 35 U.S.C. § 103.

> *The ever present question in cases within the ambit of 35 U.S.C. § 103 is whether the subject matter as a whole would have been obvious to one of ordinary skill in the art following the teachings of the prior art at the time the invention was made. It is impermissible within the framework of Section 103 to pick and choose from any one reference only so much of it as will support a given position, to the exclusion of other parts necessary to the full appreciation of what such reference fairly suggests to one of ordinary skill in the art.* (Emphasis in original) In re Wesslau 147 U.S.P.Q. 391, 393 (CCPA 1965)

This holding succinctly summarizes the Examiner's application of references in this case because he did in fact pick and choose so much of the references to Geusic, et al. and Kikuchi et al. to support his position and did not cover completely in the Office Action the full scope of what these varied disclosure references fairly suggest to one skilled in the art.

In support of Applicants' argument made immediately above, for example, Geusic, et al. is a vertical optical waveguide (through the substrate) with an aluminum cladding and no core. Kikuchi et al. teach the use of a planar (horizontal) optical waveguide which is adhered with an adhesive to the substrate. There is no basis for combining the totally different disciplines within the optical waveguide technology as has been done in the Official Action.

Further, the Federal Circuit has stated that the Patent Office bears the burden of establishing obviousness, and that this burden can only be satisfied by showing some objective teaching in the prior art or that knowledge generally available to one of ordinary skill in the art would lead that individual to combine the relevant teachings of the reference.